

5 **SINGLE CRYSTAL SILICON SENSOR WITH HIGH ASPECT RATIO
AND CURVILINEAR STRUCTURES AND ASSOCIATED METHOD**

ABSTRACT OF THE DISCLOSURE

10 In one aspect, the invention provides semiconductor sensor which
includes a first single crystal silicon wafer layer. A single crystal silicon
structure is formed in the first wafer layer. The structure includes two
oppositely disposed substantially vertical major surfaces and two oppositely
disposed generally horizontal minor surfaces. The aspect ratio of major surface
15 to minor surface is at least 5:1. A carrier which includes a recessed region is
secured to the first wafer layer such that said structure is suspended opposite
the recessed region.

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